

IN THE CLAIMS

Please amend the claims as follows.

1. (Currently Amended) A field emitter display device, comprising:
a single crystal silicon substrate;
at least one emitter disposed above the single crystal silicon substrate comprising at least one of doped polycrystalline, microcrystalline and amorphous silicon having a coating embedded in substantially the entirety of the surface of the at least one emitter that releases electrons at a predetermined energy level, the coating acts in the presence of outgassing to inhibit degradation of the at least one emitter; and
a portion of the at least one emitter disposed furthest from the single crystal silicon substrate having asperities forming sharp peaks and valleys.
2. (Original) The field emitter display device of claim 1, wherein the coating decomposes at least one matter in the outgassing to a non-reactive state to inhibit degradation of the at least one emitter.
3. (Original) The field emitter display device of claim 2, wherein the outgassing includes organic matters.
4. (Original) The field emitter display device of claim 3, wherein the coating is titanium nitride.
5. (Original) The field emitter display device of claim 3, wherein the coating is a silicide compound.
6. (Original) The field emitter display device of claim 3, wherein the coating is a metal nitride.

7. (Currently Amended) A field emitter display device, comprising:
a single crystal silicon substrate;
at least one emitter disposed above the single crystal silicon substrate comprising at least one of doped polycrystalline, microcrystalline and amorphous silicon having a platinum coating embedded in substantially the entirety of the surface of the at least one emitter that releases electrons at a predetermined energy level, the platinum coating decomposes at least one matter in the presence of outgassing to inhibit degradation of the at least one emitter, the outgassing including organic matters.

8. (Currently Amended) A field emitter display device, comprising:
a single crystal silicon substrate;
at least one emitter disposed above the single crystal silicon substrate comprising at least one of doped polycrystalline, microcrystalline and amorphous silicon having a platinum silicide coating embedded in substantially the entirety of the surface of the at least one emitter that releases electrons at a predetermined energy level, the platinum silicide coating decomposes at least one matter in the presence of outgassing to inhibit degradation of the at least one emitter, the outgassing including organic matters.

9. – 10. (Canceled)

11. (Currently Amended) A field emitter display device, comprising:
a single crystal silicon substrate;
at least one emitter disposed above the single crystal silicon substrate comprising at least one of doped polycrystalline, microcrystalline and amorphous silicon having a coating embedded in substantially the entirety of the surface of the at least one emitter that releases electrons at a predetermined energy level, the coating decomposes at least one matter in the presence of outgassing to inhibit degradation of the at least one emitter, wherein the outgassing includes organic matters.

12. (Previously Presented) A field emitter display device, comprising:
at least one emitter comprising silicon having a coating embedded in substantially the entirety of the surface of the at least one emitter that releases electrons at a predetermined energy level, the coating is stable in the presence of outgassing to inhibit degradation of the at least one emitter.
13. (Previously Presented) A field emitter display device, comprising:
at least one emitter comprising silicon having a coating embedded in substantially the entirety of the surface of the at least one emitter that releases electrons at a predetermined energy level, the coating neutralizes at least one matter in the presence of outgassing to inhibit degradation of the at least one emitter.
14. (Previously Presented) A field emitter display device, comprising:
at least one emitter comprising silicon having a coating embedded in substantially the entirety of the surface of the at least one emitter that releases electrons at a predetermined energy level, the coating brings about heterogeneous catalysis in the presence of outgassing to inhibit degradation of the at least one emitter.
15. (Previously Presented) A field emitter display device, comprising:
at least one emitter comprising silicon having a coating embedded in substantially the entirety of the surface of the at least one emitter that releases electrons at a predetermined energy level, the coating acts in the presence of the outgassing to inhibit degradation of the at least one emitter; and
a light-emitting target that radiates when the released electrons strike the light-emitting target.
16. (Original) The field emitter display device of claim 15, wherein the light-emitting target is coated with luminescent matter.

17. (Original) The field emitter display device of claim 15, wherein the light-emitting target is coated with phosphorescent matter.

18. (Previously Presented) A video display, comprising:
a display screen for showing a video image; and
an array of field emission devices forming the video image, wherein the array of field emission devices comprises:

at least one emitter having a coating embedded in substantially the entirety of the surface of the at least one emitter that releases electrons at a predetermined energy level, the coating is stable in the presence of the outgassing; and

a light-emitting target that radiates when the released electrons strike the light-emitting target.

19. (Original) The video display of claim 18, wherein the coating acts to decompose at least a portion of the outgassing.

20. (Original) The video display of claim 18, wherein the coating acts to neutralizes at least one matter in the outgassing.

21. (Original) The video display of claim 18, wherein the coating acts to bring about heterogeneous catalysis in the presence of outgassing.

22. (Original) The video display of claim 18, wherein the video display is a camcorder viewfinder.

23. (Original) The video display of claim 18, wherein the video display is a flat-panel television display.

24. (Original) The video display of claim 18, wherein the video display is a display on a personal appliance.

25. (Canceled)

26. (Previously Presented) A field emitter display device, comprising:
at least one emitter having a coating that releases electrons at a predetermined energy level, the coating acts in the presence of outgassing to inhibit degradation of the at least one emitter, wherein the coating is embedded in substantially the entirety of the surface of the emitter.